

**FAST RECOVERY DIODE**

TOSHIBA (DISCRETE/OPTO)

39 DE 9097250 0002242 9

**1S2711** 1500V 1.5A**MAXIMUM RATINGS**

CHARACTERISTIC	SYMBOL	RATING	UNIT
Repetitive Peak Reverse Voltage	$V_{RRM}$	1500	V
Non-Repetitive Peak Reverse Voltage	$V_{RSM}$	1600	V
Average Forward Current ( $T_a=20^\circ\text{C}$ )	$I_{F(AV)}$	1.5	A
Peak One Cycle Surge Forward Current (Non-Repetitive)	$I_{FSM}$	60(50Hz)	A
Junction Temperature	$T_j$	-40~125	$^\circ\text{C}$
Storage Temperature Range	$T_{stg}$	-40~150	$^\circ\text{C}$

**ELECTRICAL CHARACTERISTICS**

CHARACTERISTIC	SYMBOL	CONDITION	MIN.	TYP.	MAX.	UNIT
Peak Forward Voltage	$V_{FM}$	$I_{FM}=2.0\text{A}$ , $T_j=25^\circ\text{C}$	—	—	1.2	V
Repetitive Peak Reverse Current	$I_{RRM} (1)$	$V_{RRM}=\text{Rated}$ , $T_j=25^\circ\text{C}$	—	—	10	$\mu\text{A}$
	$I_{RRM} (2)$	$V_{RRM}=\text{Rated}$ , $T_j=125^\circ\text{C}$	—	—	600	$\mu\text{A}$
Reverse Recovery Time	$t_{rr}$	$I_F=20\text{mA}$ , $I_R=1\text{mA}$ , $T_j=25^\circ\text{C}$	—	—	20	$\mu\text{s}$
Forward Recovery Voltage	$V_{fr}$	$I_F=0.1\text{A}$ , $t_r=100\text{ns}$ , $t_p=5\mu\text{s}$ , $T_j=25^\circ\text{C}$	—	—	5	V

Notes: 1. Soldering: 5mm is the minimum to be kept between case and soldering part.

2. Lead Bending: 5mm is the minimum to be kept from the case when bend the lead wire.

**3JH61** 600V 3A**MAXIMUM RATINGS**

CHARACTERISTIC	SYMBOL	RATING	UNIT
Repetitive Peak Reverse Voltage	3BH61	100	V
	3DH61	200	
	3GH61	400	
	3JH61	600	
Average Forward Current	$I_{F(AV)}$	1.5 * 1	A
		3.0 * 2	
Peak One Cycle Surge Forward Current (Non-Repetitive)	$I_{FSM}$	60(50Hz)	A
Junction Temperature	$T_j$	-40~150	$^\circ\text{C}$
Storage Temperature Range	$T_{stg}$	-40~150	$^\circ\text{C}$

\* 1 No Heat Sink \* 2 With Heat Sink

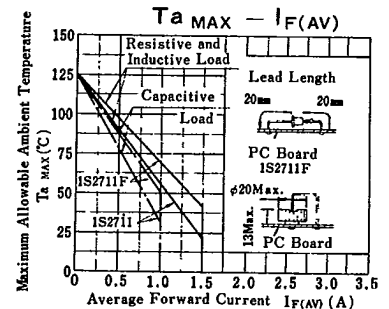
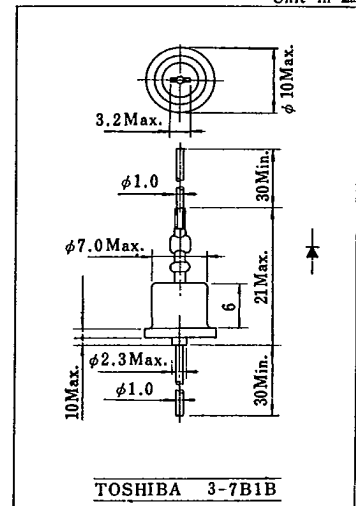
**ELECTRICAL CHARACTERISTICS**

CHARACTERISTIC	SYMBOL	CONDITION	MIN.	TYP.	MAX.	UNIT
Peak Forward Voltage	$V_{FM}$	$I_{FM}=3\text{A}$ , $T_j=25^\circ\text{C}$	—	—	1.4	V
Repetitive Peak Reverse Current	$I_{RRM} (1)$	$V_{RRM}=\text{Rated}$ , $T_j=25^\circ\text{C}$	—	—	20	$\mu\text{A}$
	$I_{RRM} (2)$	$V_{RRM}=\text{Rated}$ , $T_j=150^\circ\text{C}$	—	—	3000	$\mu\text{A}$
Reverse Recovery Time	$t_{rr} (1)$	$I_F=20\text{mA}$ , $I_R=1\text{mA}$ , $T_j=25^\circ\text{C}$	—	—	1.5	$\mu\text{s}$
	$t_{rr} (2)$	$I_F=20\text{mA}$ , $I_R=20\text{mA}$ , $T_j=25^\circ\text{C}$	—	—	0.5	$\mu\text{s}$
Forward Recovery Voltage	$V_{fr}$	$I_F=0.1\text{A}$ , $t_p=5\mu\text{s}$ , $T_j=25^\circ\text{C}$	—	—	10	V

Notes: 1. Soldering: 5mm is the minimum to de kept between case and soldering part.

2. Lead Bending: 5mm is the minimum to be kept from the case when bend the lead wire.

Unit in mm



Unit in mm

